

## COLLEGE OF LETTERS AND SCIENCES Major Planning Guide MATHEMATICS - APPLIED MATH EMPHASIS, Bachelor of Science – minor required

\*Not an official document. Refer to Advising Report for full requirements. Sample Advising Reports available on-line <a href="http://www.uww.edu/registrar/ars/index.html">http://www.uww.edu/registrar/ars/index.html</a>

Major Planning Guides are sample programs which illustrate the type of curriculum a student will take to complete the degree in 4 years.

All students must complete a minimum of 120 credits including

- 1) at least 32 units of general education, including specific Gened courses, as well as approved math and science, physical education and elective courses
- 2) requirements for the BA or BS Degree
- 3) requirements for the major and for the minor if required

\*The Bachelor of Science requires two lab sciences and 5 credits of advanced math or 3 of math and 3 of computer science. This Planning sheet will use Math 152 Elementary Functions for the math requirement.

Courses in **Bold** typeface indicate specific courses that must be completed for the major. Other courses such as Gened Courses or major/minor electives can be selected from a number of course choices.

Freshman Year	
English 101* Freshman English—3 units	English 102* Freshman English—3 units
Math 152 Elementary Functions —5 units	Math 253 Calculus with Analytic Geometry I – 5 units
Lab Science (GL) – 4-5 units	Lab Science for BS*—4-5 units
Gened 130 Individual and Society—3 units	Gened 120 Historical Perspectives or 140 Global Perspectives—3 units
Intra-university 104 New Student Seminar—1 unit	PE General 192 Personal Health—1 unit
16-17 units	16-17 units
Sophomore Year	
Math 254 Calculus with Analytic Geometry II – 5 units	Math 255 Calculus with Analytic Geometry III – 3 units
Math 280 Discrete Mathematics – 3 units	Math 355 Matrices & Linear Algebra – 3 units
Gened 110 World of the Arts—3 units	CompSci 171 or 172 Intro to Programming – 3 units
Comm 110 Intro. to Human Communication—3units	General Ed elective (GA, GE, GH, GI, or GS) —3 units
Minor Course—3 units	Minor Course—3 units
17 units	15 units
Junior Year	
Math 361 Differential Equations – 3 units	Math 301 Introduction to Analysis – 3 units
Math 463 Complex Analysis or Math 471 Numerical Analysis – 3 units	Math 458 Applied Math Analysis or Math 459 Partial Diff Eq – 3 units
English 370 Adv Comp or English 372 Tech & Scientific Writing – 3 units	General Ed elective (GA, GE, GH, GI, or GS) —3 units
Gened 390 World of Ideas—3 units	Minor Course—3 units
Minor Course—3 units	Minor Course—3 units
15 units	15 units
Senior Year	
Math 471 Numerical Analysis or Math 463 Complex Analysis – 3 units	Math 459 Partial Diff Eq or Math 458 Applied Math Analysis – 3 units
Diversity Course – 3 units	General Ed elective (GA, GE, GH, GI, or GS) —1 unit
General Ed elective (GA, GE, GH, GI, or GS) —3 units	Minor Course—3 units
Minor Course—3 units	Electives – 6 units
Minor Course—3 units	
15 units	13 units

Department Website: <a href="http://math.uww.edu/">http://math.uww.edu/</a>